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(71) Applicant: AT&T Corp.
New York, NY 10013-2412 (US)

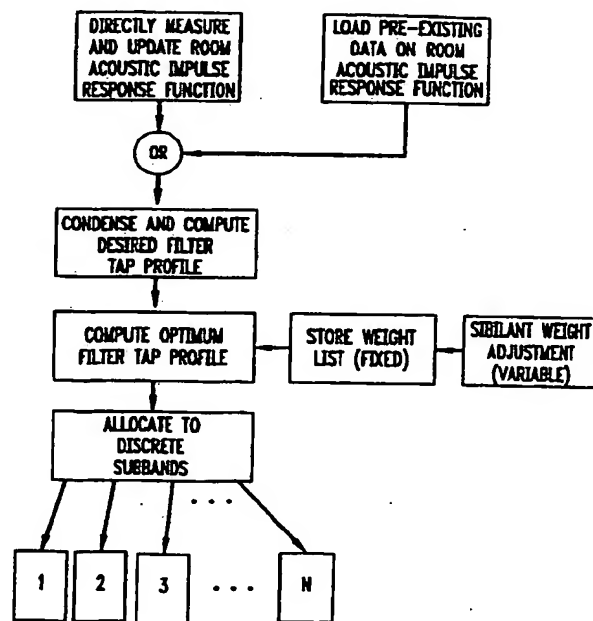
(72) Inventor: Diethorn, Eric John
Morristown, New Jersey 07960 (US)

(74) Representative:
Johnston, Kenneth Graham et al
Lucent Technologies (UK) Ltd,
5 Mornington Road
Woodford Green Essex, IG8 OTU (GB)

(54) Optimization of adaptive filter tap settings for subband acoustic echo cancellers in teleconferencing

(57) A subband acoustic echo canceller for a telecommunications teleconferencing room is equipped with subband adaptive filters and filter taps associated with said subbands. A data store is provided containing a weight list for controlling allocation of the filter taps among the subbands. An optimum tap profile as determined by the weights is a composite of room acoustic impulse response and weighting adjustments based on one or more measures of perceived human acoustic sensitivity experienced by far-end users. An active periodic adjustment of the weights responsive to detection of sibilant energy in the incoming path further improves echo cancellation. Active measurement and updating of the room acoustic impulse response provides further refinement.

FIG. 12



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EUROPEAN SEARCH REPORT

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DOCUMENTS CONSIDERED TO BE RELEVANT			
Category	Citation of document with indication, where appropriate, of relevant passages	Relevant to claim	CLASSIFICATION OF THE APPLICATION (Int.Cl.6)
A	EP 0 615 350 A (NIPPON ELECTRIC CO) 14 September 1994 * page 2 - page 3 *	1-11	H04M9/08
A	TAHERNEZHADI M ET AL: "ACOUSTIC ECHO CANCELLATION USING SUBBAND TECHNIQUE FOR TELECONFERENCING APPLICATIONS" PROCEEDINGS OF THE GLOBAL TELECOMMUNICATIONS CONFERENCE (GLOBECOM), SAN FRANCISCO, NOV. 28 - DEC. 2, 1994, vol. 1, 28 November 1994, pages 243-247, XP000488551 INSTITUTE OF ELECTRICAL AND ELECTRONICS ENGINEERS * page 244, column 2 *	1,5	
			TECHNICAL FIELDS SEARCHED (Int.Cl.6)
			H04M
The present search report has been drawn up for all claims			
Place of search THE HAGUE		Date of completion of the search 17 February 1999	Examiner Schweitz, M
CATEGORY OF CITED DOCUMENTS		T : theory or principle underlying the invention E : earlier patent document, but published on, or after the filing date D : document cited in the application L : document cited for other reasons & : member of the same patent family, corresponding document	
X : particularly relevant if taken alone Y : particularly relevant if combined with another document of the same category A : technological background O : non-written disclosure P : intermediate document			

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